

CLAIMS

1. A pneumatic tire comprising
a carcass extending between bead portions through a tread portion and sidewall portions, and
a belt disposed radially outside the carcass in the tread portion, wherein
at least one of the carcass and the belt is reinforced with aliphatic polyketone fiber cords.
2. The pneumatic tire according to in claim 1, wherein
the belt comprises a breaker disposed on the radially outside of the carcass, and a band disposed on the radially outside of the breaker, and
the band comprises the aliphatic polyketone fiber cords whose cord angles are not more than 5 degrees with respect to the tire circumferential direction.
3. The pneumatic tire according to in claim 2, wherein
the aliphatic polyketone fiber cords each have
a tensile strength of not less than 9.8 g/d,
a standard elongation of not more than 5.0 %, and
a dry heat shrinkage of not more than 6.0 %,
the sum of the standard elongation and the dry heat shrinkage is not more than 9 %,
a twist coefficient N is in a range of from 1500 to 2000,
the twist coefficient N is the product ($Tx\sqrt{D}$) of the square root of a total denier number D of the cord and the twist number T (turnes/10 cm) of the cord.
4. The pneumatic tire according to in claim 1, wherein
the carcass comprises at least one ply of aliphatic polyketone fiber cords arranged radially at an angle of from 75 to

90 degrees with respect to the circumferential direction of the tire,

the aliphatic polyketone fiber carcass cords each have
a tensile strength of not less than 15.0 g/d,
a standard elongation of not more than 3.0 %, and
a dry heat shrinkage of not more than 3.0 %,
the sum of the standard elongation and the dry heat
shrinkage is not more than 5.5 %.

5. The pneumatic tire according to in claim 4, wherein
the aliphatic polyketone fiber carcass cords each have a
total denier number D in a range of from 2000 to 4500 deniers, and
a twist coefficient N is in a range of from 1000 to 2500,
the twist coefficient N is the product ($Tx\sqrt{D}$) of the square root
of the total denier number D and the twist number T (turnes/10 cm)
of the cord.

6. The pneumatic tire according to in claim 4, wherein
the belt comprises a breaker comprising at least one ply
of aliphatic polyketone fiber cords laid at an angle in a range of
from 10 to 35 degrees with respect to the circumferential
direction of the tire.

7. The pneumatic tire according to in claim 6, wherein
the aliphatic polyketone fiber cord used in the breaker
has a tensile strength of not less than 15.0 g/d, a standard
elongation of not more than 3.0 %, and a dry heat shrinkage of not
more than 3.0 %, and the sum of the standard elongation and dry
heat shrinkage is not more than 5.5 %, and

the total denier number of the cord is in a range of from
2000 to 4500 deniers, and

the twist coefficient is in a range of from 1000 to 2500.